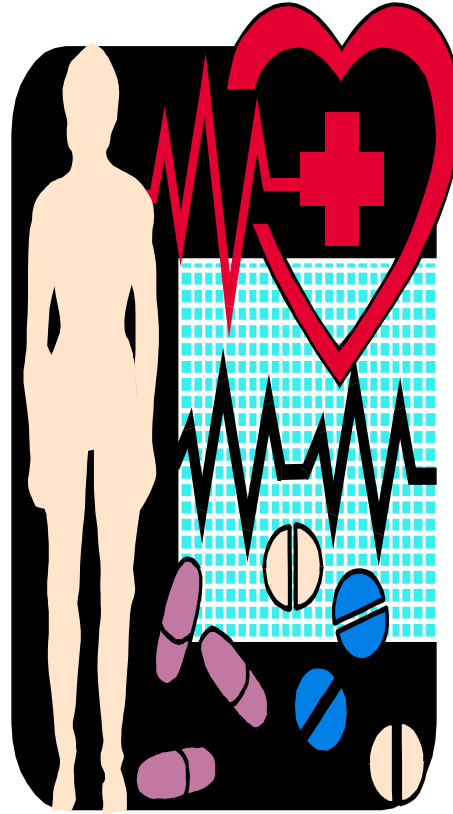# Offline Processing Areas Orientation Briefing
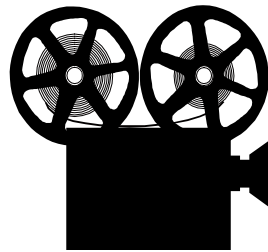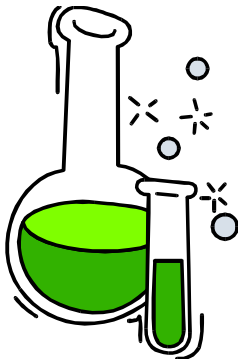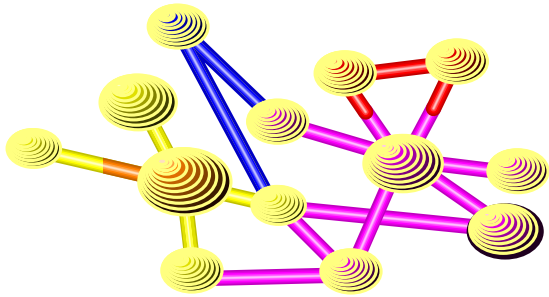
Space Station Processing Facility (SSPF)

Offline Processing Areas Orientation Briefing Agenda

Offline Processing Areas Orientation Briefing Agenda

Offline Processing Areas Orientation Briefing Objectives

- To introduce the payload customers to the Offline Processing Areas (OPA)
- Facilities at the Operations and Checkout Facility (O&C) and / or the Space Station Processing Facility (SSPF) at Kennedy Space Center (KSC)
- To introduce the payload customers to the main points of contact for facility mission operations
- To communicate personnel and equipment safety, such as fire alarms and hazardous operations or   c
- ommodities in the vicinity
- To communicate Boeing's and NASA's responsibilities and services to the customer
- To establish the customer's responsibilities

Additonal Support or Equipment Request

- Any request for support or equipment, not previously identified in the PRD, must be approved by the NASA Customer
- Integration Manager (CIM) or the Boeing Launch Site Support Engineer (LSSE).
- Requirement must be in writing indicating the due date and duration of support or equipment needed. Commodities must identify quantity and specific grade.
- If additional support is identified once you arrive at KSC, notify the following:
    - Technical Support - Notify NASA CPSM or Boeing OPAM
    - Commodities or Supplies - Notify the NASA CPSM or Boeing OPAM
    - Equipment - Notify the Boeing OPAM or the NASA CPSM

Offline Processing Areas Orientation Briefing
Boeing's Responsibilities

Develop and implement pre-flight and post-flight processing activities including:

- **Payload requirements management**
    - Provide Offline Processing Areas, equipment, supplies and general services requested by the customer as recorded in the Program Requirements Document (PRD)
- **Facility and equipment support**
    - Configure Offline Processing Areas for simulation, pre-flight, in-flight and post-flight operations
    - Coordinate facility maintenance (including power and temperature control)
- **General logistics**
    - Coordinate personnel access
    - Coordinate equipment and supply shipping
    - Coordinate activities for unpacking and loading large equipment

Offline Processing Areas Orientation Briefing
NASA's Responsibilities

Develop and implement pre-flight and post-flight processing activities including:

- **Payload requirements management**
  - Provide Offline Processing Areas, equipment, supplies and general services requested by the customer as recorded in the PRD

- **Support**
  - Provide office space and equipment for customers involved in pre-flight, in flight and post flight mission processing as requested in the PRD

- **General logistics**
  - Coordinate personnel access
  - Coordinate equipment and supply shipping
  - Coordinate activities for unpacking and loading large equipment

Offline Processing Areas Orientation Briefing
Customer's Responsibilities

- **Submit payload requirements**
  - Request Offline Processing Areas, equipment, supplies, and general services through the Launch Site Support Plan (LSSP) including dates required and associated hazards
  - Submit special requirements (e.g., power, temperature control, biomedical, radioactive and/or chemical waste disposal, special shipping/receiving, etc.)
- **Submit schedules and personnel access list**
  - Provide facility and equipment utilization schedules for simulation, mission and pre-flight, in-flight, and post-flight operations
  - Provide list of authorized personnel for Offline Processing Areas access
- **Offline Processing Area configuration**
  - Unpack and setup customer owned equipment supplies, chemicals and other items shipped to OLL
- **Offline Processing Area de-configuration**
  - Return Offline Processing Areas to original configuration and pack customer owned equipment

Offline Processing Areas Orientation Briefing
Personnel Interfaces

- Customer Processing Support Manager

- Launch Site Support Engineer

- Customer Integration Manager

- NASA Quality

- Offline Processing Area Manager

- Science and Experiment Management

- Shipping and Receiving

- Lisa Brawn, NASA / UB-B1

  Patti Skipper, NASA / UB-B1

- Kim Page, Boeing / T918

- Jack Keifenheim

  Amy Asato

  Bob Sturm

  Welmon Speed

  Joann Archer

- Jim Reed

- Cindy Ward

- Guy Etheridge

  Mimi Shao

- Brenda Forbes

Offline Processing Areas Orientation Briefing
Facility Layout - SSPF

OLL FLOOR PLAN
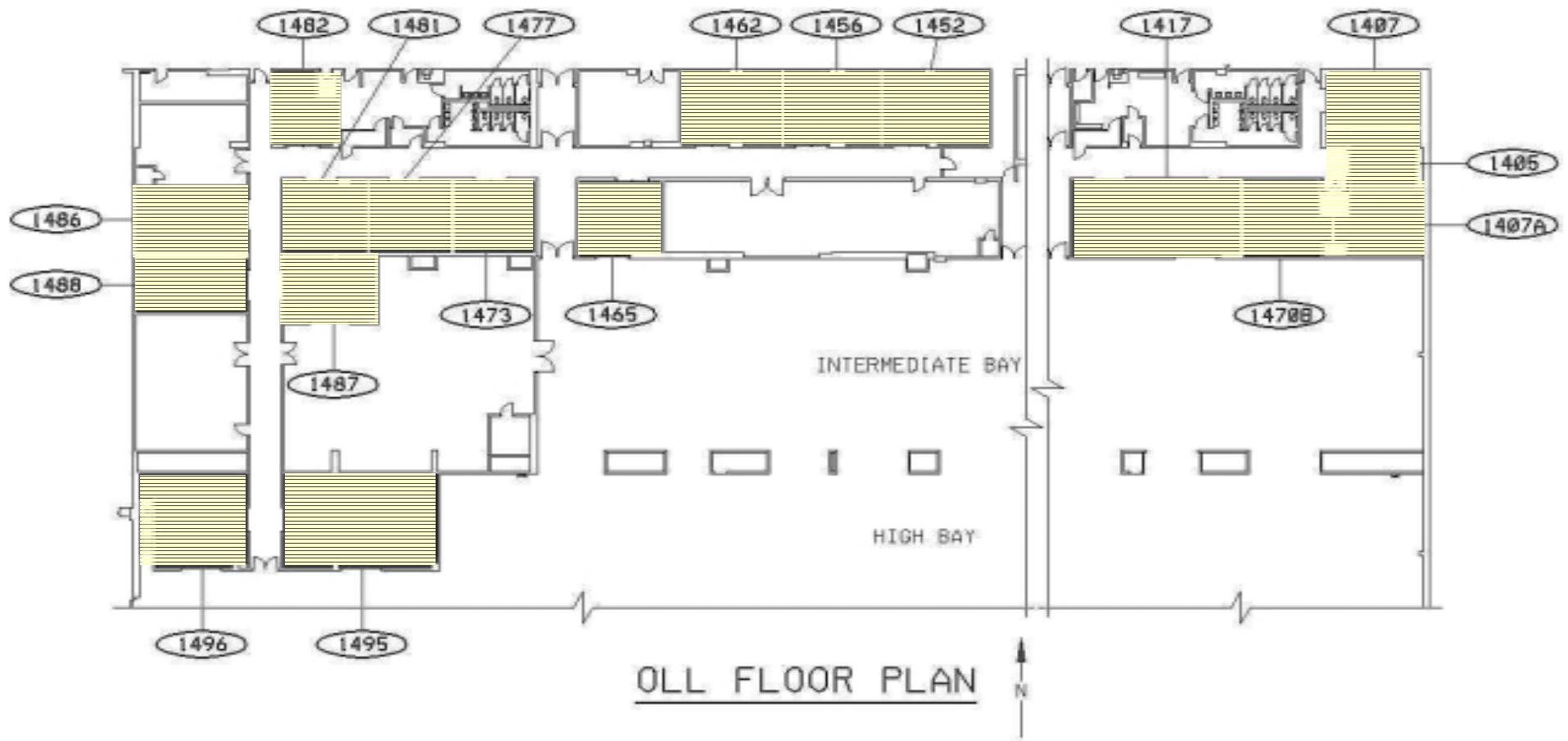
Offline Processing Areas Orientation Briefing
Facilities Access and Security - General

- Badge must be displayed for guard at entrance gate upon entering Kennedy Space Center (KSC) and Cape Canaveral Air Station (CCAS). Personnel with a temporary badge may be requested to present a form of picture ID.

- Badge must be displayed above the waist unless otherwise designated.

- You and your vehicle are subject to search at any time while on KSC or CCAS premises.

- All State of Florida motor vehicle regulations must be followed while operating a motor vehicle on KSC or CCAS. **Seatbelts must be worn at all times.**

- **No firearms, illegal drugs or alcohol (including empty containers) are permitted at any time.**

- No eating, drinking or smoking in the Offline Processing Areas.

- Facility Offline Processing Areas are open 24 hours a day, 7 days a week, 365 days a year.

- Offline Processing Areas in the SSPF will be assigned new cipher codes for each mission.

Offline Processing Areas Orientation Briefing
Facilities Access and Security - SSPF

High Bay Access

- High bay access is controlled by security monitors and by PACAS card readers.
- Only personnel designated by the Payload Mission Manager and who are properly badged will be allowed in the high bay area.

Offline Processing Area Access

- Access to Offline Processing Area requires cipher code which will be distributed per Payload Mission Management or Customer Processing Support Manager (CPSM).
- Operating hours are set by payload personnel utilizing the Offline Processing Area.

Note: Anhydrous ammonia may be present in the facility. Personnel must evacuate the facility and the Offline Processing Area when they hear the fire alarm

Transient Office Space

- A facility cipher code will be assigned for each office area.

- Operating hours are set by the payload personnel utilizing the office space.

- Daily Closing Procedures (to be completed by the last person to leave the office area each night):
    – Turn off coffeemaker (fire hazard)
    – Turn off copy machine (overheating)
    – Turn off all lights
    – Lock all doors

Offline Processing Areas Orientation Briefing
SSPF Emergency Egress Routes

Marshalling Areas are located 75 ft from the Building in the Parking Lot Areas

• **Payload Customer to appoint person to account for evacuated personnel**
  Proceed to front of building
• **Be alert for fire response vehicles**
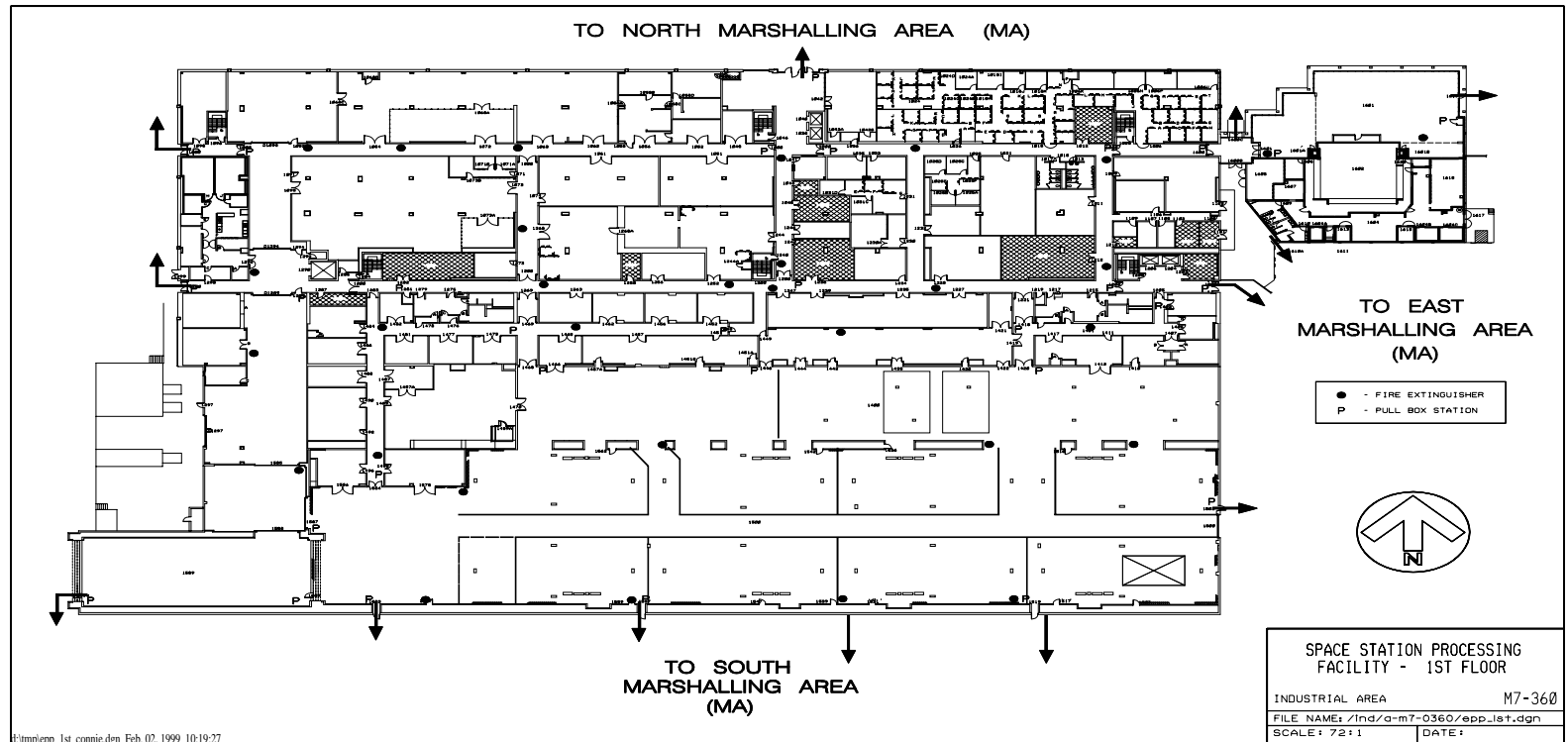
Offline Processing Areas Orientation Briefing
Offline Processing Area Safety - General

- Payload customers should familiarize themselves with the location of all safety items in their work area:
  - Safety glasses and other personal protective equipment
  - Eyewash /safety shower
  - Fire extinguisher
  - Emergency egress routes and emergency phone numbers
  - Sharps and other waste containers

- When using biological safety cabinets equipped with an ultraviolet light source, appropriate safety measures should be used (e.g., donning safety glasses in the work area; turning the light off when not in use).

- Chemical Fume Hoods will require vent emission utilization logs to be completed each time the unit is used. (See page 28)
- Hazardous and flammable substances should be stored in the designated storage containers (POL - portable oil locker)
  - All products will be clearly marked using the English language with the following:
    - Product Identity
    - Manufacturer's Name, Address and/or Phone Number
    - Appropriate Hazard Warnings
    - Hazardous Materials Identification System (HMIS Label)
  - Material Safety Data Sheets (MSDS) should be readily available in the Offline Processing Area.
  - A clear path must be maintained to the POL.

- Contact the OPAM or the CPSM for any safety questions or concerns.

Offline Processing Areas Orientation Briefing
Waste Disposal Procedures (SSPF)

- Payload customers are required to label all generated waste as appropriate:
  – Place Label on Boeing-provided container or bag
  – Indicate contents and describe mixture components
  – Indicate quantity
  – Indicate concentration
  – Indicate payload or mission
  – Indicate user/generator name

- Biomedical waste bags and boxes must be labeled and should be sealed when full. Any sharp items should be placed in a sharps container and have completed labels attached.

- Payload customer will sort waste and place dry non-hazardous waste in the Satellite Accumulation Area (SAA) cans provided and notify OPAM.

- Boeing will coordinate chemical disposition for each payload. Requirements for disposal are based on information provided to NASA Safety on the Process Waste Questionnaire (PWQ).

Offline Processing Areas Orientation Briefing
Biomedical Waste Container Label

Biomedical Waste Container Label

IDENTIFICATION   DATE STARTED:_____

DATED LOGGED IN:_____

Experiment Name:_____

PI Name:_____

Room (OPA Room number):_____Building: _____

PIPETS MUST BE PUT IN BOXES

CONTENTS: Circle if applicable ___ petris ___ gloves ___wipes ___ carcasses

Other Contents:_____

Approx. Weight:_____

Offline Processing Areas Orientation Briefing
Sharps Container Label

Sharps Container Label

IDENTIFICATION

DATE STARTED:_____

DATED LOGGED IN:_____

Experiment Name:_____

PI Name:_____

Room (OPA room number):_____Building: _____

<u>DO NOT</u> PUT ITEMS OTHER THAN SHARPS INSIDE

CONTENTS: Circle if applicable ___ needles   ___blades   ___ pipettes

Other Contents:_____

Offline Processing Areas Orientation Briefing
Vent Emission Utilization Form

FACILITY NAME:		AREA MANAGER:		
FACILITY NUMBER:		ROOM NUMBER/AREA:		

	DATE DA/MO/YR	CHEMICAL PRODUCT	QUANTITY USED PROVIDE UNITS	DURATION (HRS)	LAST NAME OF USER (PRINT)
1					
2					
3					
4					
5					
6					
7					
8					
9					
10					
11					
12					
13					
14					
15					
16					
17					
18					
19					
20					
21					
22					
23					
24					
25					

NOTE: Chemical Product refers to either chemical or product name

NOTE: Duration refers to time period product actually used in fume hood

Offline Processing Areas Orientation Briefing
Late Access and Launch Operations

- NASA Utilization or Spacehab personnel schedule all Late Access activities. Customer Integration Manager (CIM) will coordinate facility requirements to support turnover.

- Hardware turnover will generally occur in the customer's assigned Offline Processing Area.

- Personnel designated by the Payload Mission Manager may be present during experiment hardware turnover.

- A pre-turnover meeting will be scheduled 1-3 days prior to actual turnover in order to discuss open issues.

- Names of personnel required to accompany the payload to the orbiter must be submitted to the NASA Experiment Project Engineer one month prior to late access activities. List should be provided by the Payload Mission Manager.

Utilization Payload Shipping Instructions

On-Line

DD1149 or IP/P Packing Sheet
(or Equivalent Form)

To:

Transportation Officer
PGOC Warehouse Bldg. M6-698
Kennedy Space Center, FL 32899

Mark For:

Logistics Mission Rep:
(insert name, mail code/phone Number)

KSC Point of Contact:

Customer Integration Manager:
(insert name, mail code/phone Number)

Additional contacts: add as required

Location use: Building and room

Include on Form:
1. Utilization Payloads
2. Identify for: **On-line processing**
3. Identify Flight or Non-Flight
4. Identify Mission Number
5. Identify Payload Name
6. Must address any issue affecting KSC on-line
   processing, or note "no issues for KSC on-line
   processing", or note that "issues affecting KSC
   KSC on-line processing are addressed in the IDP.
   These statement on the shipper must be "validated"
   with a Quality stamp or customer signature.

Off-Line

DD1149 or IP/P Packing Sheet
(or Equivalent Form)

To:

Transportation Officer
PGOC Warehouse Bldg. M6-698
Kennedy Space Center, FL 32899

Mark For:

Owner name, phone number

KSC Point of Contact:

Customer Integration Manager:
(insert name, mail code/phone Number)

Additional contacts: add as required

Location use: Building and room

Include on Form:
1. Utilization Payloads
2. Identify for: **Off-line processing**
3. Identify Flight or Non-Flight
4. Identify Mission Number
5. Identify Payload Name
6. Must address any issue affecting KSC on-line
   processing, or note "no issues for KSC on-line
   processing", or note that "issues affecting KSC
   KSC on-line processing are addressed in the IDP
   These statement on the shipper must be "validat
   with a Quality stamp or customer signature.

Offline Processing Areas Orientation Briefing
Phone Dialing Instructions

- **800 Numbers:**   Dial 5 - 1 - 800 - Number

- **AT&T Operator:**   Dial 5 - 1 - 800 - 225 - 5288

- **Between O&C and SSPF:**   Dial 7 - Extension
- **Between KSC and CCAS:**   Dial 5 - 853 - Extension

- **KSC Operator:**   Dial 0

- **Local Call (Off Center):**   Dial 5 - Number

- **Long Distance (Outside of U.S.):**   Dial 0

- **Long Distance (Within U.S.):**   Dial 8 - Area Code - Number

*NOTE: No collect calls.

* EMERGENCIES: Dial 9 - 1 - 1

KSC Telephone Misuse and Abuse

The misuse and abuse of Government telephone equipment and services can be a cause for termination of employment. Recent personnel actions have shown this to be true and such misuse and abuse will not be tolerated by the Government or Contractors here at Kennedy Space Center.

Some cases of telephone abuse are:

Bringing in personal laptop computers and unplugging telephones to use the lines to connect to Internet Gateways

- Unauthorized long distance personal calls on FTS (includes KSC, CCAS, other off Center locations and Government-issued telephone calling cards)

- Excessively long duration personal calls to local dialing area or toll free long distance numbers

- Using Government provided telephones to operate a business for personal gain from KSC

- Calls to radio or television station talk shows both inside and outside the local dialing area

- Willful damage to telephone equipment

- Personal calls on Government - provided cellular telephones

THE FOLLOWING TYPES OF CALLS MAY BE PLACED ON GOVERNMENT - PROVIDED TELEPHONES:
Official calls

- Emergency calls

- Authorized personal calls, including the following types of calls: 1) calls that do not adversely affect the performance of official duties by the employees or the employee's organization; 2) the calls are of reasonable duration and frequency; and 3) the calls could not reasonably have been made at another time.

- Certain personal long distance calls can be made at Government expense to locations within the local commuting area (such as to a spouse or dependents) providing they are of reasonable duration and frequency.

- ROUTINE REVIEWS OF OUTGOING TELEPHONE CALLS FROM KSC WILL CONTINUE. KSC EMPLOYEES WHO CONTINUE TO VIOLATE THE REGULATIONS CONCERING TELEPHONE USAGE WILL BE SUBJECT TO DISCIPLINARY ACTION.   *FURTHER GUIDANCE ON THE PROPER USE OF GOVERNMENT TELEPHONES IS FOUND IN NMI2540.1C AND 41 CFR SUBPART 201-21.6.*

Offline Processing Areas Orientation Briefing
Computer Usage Information

- Any computer problems should be addressed to 867-ODIN.

- <u>No</u> software will be allowed to be copied from the Boeing/NASA personnel computers onto the customer computer for any reason.   Such actions are considered as an act of <u>software piracy</u> and shall be dealt with legally.

- Exit out of modem links when **<u>NOT</u>** in use.

- Under no circumstances will there be any computer equipment movement without prior consent from the Computer Coordinator.

- Please be considerate; computer resources are shared. Allocate time and work activities, accordingly.

- All computers having a "Leave On" sign should remain on at all times and should <u>not</u> be rebooted without permission from the Computer Coordinator.

- All computers designed for the payload will be provided with limited software. It is illegal to copy this software. All specific software must be provided by the customer.

- Please do not delete software from the hard drive.

- Computer virus control will be maintained by the Network Coordinator.

Offline Processing Areas Orientation Briefing Guidelines for Contamination Control in Clean Work Areas(CWA)

OPERATION	LIMITATIONS / RESTRICTIONS	CONTAMINATION CONTROL PROCEDURES
MINOR SANDING	TOTAL AREA LESS THAN 16 SQUARE INCHES. HAND SANDING ONLY.	WET SAND WHEN POSSIBLE. VACUUM PARTICULATE MATTER AS IT IS GENERATED. CLEAN SURROUNDING AREA DURING AND AFTER OPERATION. MINIMIZE PERSONNEL IN IMMEDIATE AREA.
**MAJOR SANDING	TOTAL AREA GREATER THAN 16 SQUARE INCHES OR POWER SANDING.	IN ADDITION TO MEASURES FOR MINOR SANDING, PROTECTIVE TENT REQUIRED AROUND OPERATION. POWER SANDING STRONGLY DISCOURAGED.
MINOR GRINDING	TOTAL AREA LESS THAN 16 SQUARE INCHES. HAND FILING / GRINDING ONLY.	VACUUM PARTICULATE MATTER AS IT IS GENERATED. CLEAN SURROUNDING AREA DURING AND AFTER OPERATION. MINIMIZE PERSONNEL IN IMMEDIATE AREA.
**MAJOR GRINDING	TOTAL AREA GREATER THAN 16 SQUARE INCHES OR POWER GRINDING. POWER GRINDING REQUIRES BURN PERMIT.	IN ADDITION TO MEASURES FOR MINOR GRINDING, PROTECTIVE TENT REQUIRED AROUND OPERATION. POWER GRINDING STRONGLY DISCOURAGED.
MINOR SAWING	SAW LINE LESS THAN 8 INCHES. HAND SAWING ONLY.	VACUUM PARTICULATE MATTER AS IT IS GENERATED. CLEAN SURROUNDING AREA DURING AND AFTER OPERATION. MINIMIZE PERSONNEL IN IMMEDIATE AREA.
**MAJOR SAWING	SAW LINE GREATER THAN 8 INCHES OR POWER SAWING.	IN ADDITION TO MEASURES FOR MINOR SAWING, PROTECTIVE TENT REQUIRED AROUND OPERATION. POWER SAWING STRONGLY DISCOURAGED.
**DRILLING	LOW SPEED ONLY. MINIMIZE USE OF CUTTING OILS.	VACUUM PARTICULATE MATTER AS IT IS GENERATED. CLEAN SURROUNDING AREA DURING AND AFTER OPERATION. MINIMIZE PERSONNEL IN IMMEDIATE AREA.
MINOR PAINT REMOVING - MECHANICAL -	TOTAL AREA LESS THAN 16 SQUARE INCHES. HAND SANDING ONLY.	USE MINOR SANDING PROCEDURE.

Offline Processing Areas Orientation Briefing
Guidelines for Contamination Control in CWA (cont'd)

OPERATION	LIMITATIONS / RESTRICTIONS	CONTAMINATION CONTROL PROCEDURES
MINOR PAINT REMOVING - CHEMICAL -	TOTAL AREA LESS THAN 4 SQUARE INCHES. CHEMICAL STRIPPER MUST BE APPROVED BY PGOC M&P ENGINEERING.	PREPARE STRIPPER OUTSIDE OF CWA. MINIMIZE AMOUNT OF STRIPPER BROUGHT INTO CWA - 2 FL OZ MAXIMUM. UTILIZE PORTABLE HEPA FILTERED EXHAUST UNIT TO CAPTURE SOLVENT FUMES WHILE PAINTING.
MAJOR PAINT REMOVING	TOTAL AREA GREATER THAN 16 SQUARE INCHES. GENERALLY NOT ALLOWED IN CWA.	
TOUCH-UP PAINTING	TOTAL AREA LESS THAN 16 SQUARE INCHES. BRUSH PAINTING ONLY - NO SPRAY PAINTING.	MIX / STIR PAINT OUTSIDE OF CWA. MINIMIZE AMOUNT OF PAINT BROUGHT INTO CWA - 2 FL OZ MAXIMUM. UTILIZE PORTABLE HEPA FILTERED EXHAUST TO CAPTURE PAINT FUMES WHILE PAINTING.
MAJOR PAINTING	TOTAL AREA GREATER THAN 16 SQUARE INCHES. BRUSH PAINTING ONLY - NO SPRAY PAINTING.	MIX / STIR PAINT OUTSIDE OF CWA. MINIMIZE AMOUNT OF PAINT BROUGHT INTO CWA - 4 FL OZ (PER CONTAINER) MAXIMUM. PROTECTIVE TENT MUST ENCLOSE OPERATION. FUMES INSIDE TENT MUST BE EXHAUSTED OUTSIDE OF CWA. MAJOR PAINTING STRONGLY DISCOURAGED.
SOLDERING	BURN PERMIT REQUIRED. LIMITED TO MINOR REPAIR / ASSEMBLY WORK.	UTILIZE PORTABLE HEPA FILTERED EXHAUST UNIT OR FACILITY VACUUM SYSTEM TO CAPTURE SOLDER SMOKE. EXTENSIVE SOLDERING WILL REQUIRE A PROTECTIVE TENT TO ENCLOSE AND EXHAUST THE SMOKE.
WELDING, CUTTING, BRAZING	GENERALLY NOT ALLOWED IN CWA.	

CONTACT OPERATIONS ENGINEERING, FACILITY MANAGEMENT OR THE CCE PRIOR TO PERFORMING ANY POTENTIAL CONTAMINATION GENERATING OPERATION.

THE PROCEDURES WITHIN THIS GUIDE ARE TO BE CONSIDERED MINIMUM REQUIREMENTS. MORE STRINGENT REQUIREMENTS MAY BE IMPOSED BY FACILITY MANAGEMENT, THE CCE, AND/OR OTHER AFFECTED PARTIES.

** ASTERISKS DENOTE OPERATIONS REQUIRING PRE-APPROVAL BY OTHER AFFECTED PARTIES. CONTACT OPERATIONS ENGINEERING, FACILITY MANAGEMENT OR THE CCE TO ARRANGE FOR APPROVAL.

NOTE: WORK REQUIRING AN OPEN FLAME MUST BE COORDINATED WITH THE FIRE INSPECTOR FOR APPROVAL AND OR A BURN PERMIT.